

Amendments to the Claims:

This listing of claims replaces all prior versions and listings of claims in the application:

Listing of Claims:

1. (Currently amended) ~~An thin-layer~~ LED chip comprising
an epitaxial layer sequence that is disposed on a carrier element, and comprises an
electromagnetic-radiation-generating active region, and contains at least one semiconductor layer
with at least one surface having an intermixing structure that leads to an approximately ergodic
distribution of the light in the epitaxial layer sequence, and

a reflective layer that is disposed on a principal surface of said epitaxial layer sequence
facing toward said carrier element and reflects at least a portion of the electromagnetic radiation
generated in said epitaxial layer sequence back thereinto,

wherein-disposed on a radiation extraction surface of said epitaxial layer sequence facing
away from said carrier element is a structured layer containing a glass material and exhibiting a
structure that includes mutually adjacent protuberances that taper away from said radiation
extraction surface and have a lateral grid size that is smaller than one wavelength of an
electromagnetic radiation emitted from said epitaxial layer sequence.

2. (Currently amended) The ~~thin-layer~~ LED chip as in claim 1, wherein the refractive
index of said layer lies between the refractive index of a material of a side of said epitaxial layer
sequence adjacent said radiation extraction surface and the refractive index of a medium
intended as an ambient for said thin-layer LED chip.

3. (Currently amended) The ~~thin-layer~~ LED chip as in claim 1, wherein-said structure
comprises protuberances that are largely periodically arranged.

4. (Currently amended) The ~~thin-layer~~ LED chip as in claim 1, said protuberances[[(5)]] are convexly curved as viewed from the outside.

5. (Currently amended) The ~~thin-layer~~ LED chip as in claim 1, wherein said glass material is a spin-on glass.

6. (Currently amended) The ~~thin-layer~~ LED chip as in claim 1, the height of said protuberances in the direction away from said radiation extraction surface is smaller than one wavelength of an electromagnetic radiation emitted from said epitaxial layer sequence.

7. (Currently amended) A method for making an ~~thin-layer~~ LED chip comprising an epitaxial layer sequence that is disposed on a carrier element and contains an electromagnetic-radiation-generating active region, and at least one semiconductor layer with at least one surface having an intermixing structure that leads to an approximately ergodic distribution of the light in the epitaxial layer sequence, and a reflective layer that is disposed on a principal surface of said epitaxial layer sequence facing toward said carrier element and reflects at least a portion of the electromagnetic radiation generated in said epitaxial layer sequence back therein, wherein
said epitaxial layer sequence disposed on said carrier element is prepared,
a layer containing a glass material is applied to a radiation extraction surface of said epitaxial layer sequence facing away from said carrier element, and
a structure is introduced into at least a portion of said layer, said structure including mutually adjacent protuberances that taper in the direction away from said radiation extraction surface and have a lateral grid size that is smaller than one wavelength of an electromagnetic radiation emitted from said epitaxial layer sequence.

8. (Previously presented) The method as in claim 7, wherein-said layer is fabricated by applying a still-molten spin-on glass to said radiation extraction surface and thermally treating said spin-on glass such that it hardens and densifies.

9. (Previously presented) The method as in claim 8, wherein the spin-on glass is applied by spin-coating and/or printing.

10. (Previously presented) The method as in claim 7, wherein said structure is introduced into said layer by grayscale lithography.

11. (Previously presented) The method as in claim 7, wherein said structure is introduced in such fashion that it comprises periodically arranged protuberances.

12. (Currently amended) The method as in claim 7, wherein the refractive index of said layer lies between the refractive index of a material of a side of said epitaxial layer sequence[[(6)]] facing toward said radiation extraction surface and the refractive index of a medium intended as an ambient for said ~~thin-layer~~ LED chip.

13. (Previously presented) The method as in claim 7, wherein said structure is introduced in such fashion that the height of said protuberances in the direction away from said radiation extraction surface is smaller than one wavelength of an electromagnetic radiation emitted from said epitaxial layer sequence.

14. (Currently amended) The LED ~~thin-layer-led~~ chip as in claim 2, wherein said structure comprises protuberances that are largely periodically arranged.

15. (New) The LED chip of claim 1, wherein the structure of the structured layer is such that the index of refraction of the structured layer transitions smoothly from the index of refraction of an unstructured region of the structured layer to an index of refraction of an ambient medium next to the structured layer.

16. (New) The LED chip of claim 1, wherein a width and a spacing of mutually adjacent protuberances is less than one wavelength of the electromagnetic radiation emitted from the epitaxial layer sequence.

17. (New) The LED chip of claim 5, wherein the spin-on-glass contains silicon oxide.

18. (New) The LED chip of claim 1, wherein the radiation extraction surface has depressions and the structured layer fills the depressions.

19. (New) The LED chip of claim 18, wherein the depressions are provided for homogenization of the electromagnetic radiation.